

**Government General Degree College, Dantan-II**  
**B. Sc General Part-II Internal Evaluation-2020**

**Subject: Chemistry (General)**

**Paper: III**

**F.M: 50**

**Time: 2 h**

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Answer any **one question** from each group

**Group-A** (each carry 25 marks)

1. Discuss the procedure for standardization of  $\text{KMnO}_4$  solution by standard oxalic acid solution and estimation of  $\text{Fe}^{2+}$  and  $\text{Fe}^{3+}$  in a mixture by  $\text{KMnO}_4$  solution.
2. Write the procedure and principle involved in Estimation of  $\text{Fe}^{3+}$  in a solution by standard  $\text{K}_2\text{Cr}_2\text{O}_7$  solution.
3. Write down the procedure of preparation of solution for wet test of basic radicals.
4. Write down the procedure for separation and detection of sulphite, sulphate and thiosulphate ions in same mixed sample.

**Group-B** (each carry 25 marks)

1. Write down the procedure for detection of nitrogen as special element in an organic compound.
2. Explain how nitro group is detected (i) in presence of aldehyde group (ii) in presence of amino group.
3. Write the procedure for preparation of phthalimide from urea
4. Discuss the process of preparation of benzil from benzoin.